WHAT IS CLAIMED IS:

Sub A'

1. In a radio telecommunications network, a method of updating radio network data in a plurality of devices deployed in a Base Station (BS) in the network, said method comprising the steps of:

interfacing the BS with a Mobile Switching Center (MSC) through an Internet Protocol (IP) packet data network;

assigning the BS an IP address;

sending device update data from the MSC to the BS in an IP message; and

simultaneously updating the plurality of devices by the BS.

2. The method of updating radio network data of claim 1 wherein the step of sending device update data from the MSC to the BS in an IP message includes sending the device update data in an IP multicast message, and the method further comprises, prior to assigning the BS an IP address, the step of joining the BS in a multicast group.

3. The method of updating radio network data of claim 2 wherein the step of sending device update data from the MSC to the BS in an IP message includes sending the device data to a multicast group address that comprises a multicast group designation, a device data type for the device update data, and a Base Station Identification (BSID).

4. The method of updating radio network data of claim 3 wherein the step of sending the device data to a multicast group address includes sending the device data to a multicast group address that includes a BSID that indicates that the update is applicable to a plurality of BSs in the network.

5. The method of updating radio network data of claim 4 wherein the step of sending the device data to a multicast group address that includes a BSID that indicates that the update is applicable to a plurality of BSs in the network includes sending the device data to a multicast group address that includes a BSID that indicates that the update is applicable to all BSs in the MSC's exchange.

6. The method of updating radio network data of claim 2 wherein the step of joining the BS in a multicast group includes the step of joining the BS in a plurality of multicast groups, each of said multicast groups receiving a different type of device update data.

7. The method of updating radio network data of claim 6 wherein the step of joining the BS in a plurality of multicast groups includes the steps of:

joining the BS in a first multicast group that receives device update data for Digital Control Channels (DCCHs); and

joining the BS in a second multicast group that receives device update data for Digital Traffic Channels (DTCs).

8. The method of updating radio network data of claim 1 further comprising, before the step of simultaneously updating the plurality of devices by the BS, the step of determining whether the devices are to be updated immediately or at a specified time.

9. The method of updating radio network data of claim 1 wherein the step of simultaneously updating the plurality of devices by the BS includes the steps of:

determining whether the device update data is directed to a single device in the BS or a plurality of devices in the BS; and

simultaneously updating the plurality of devices upon determining that the device update data is directed to a plurality of devices in the BS.

10. The method of updating radio network data of claim 1 wherein the step of sending device update data from the MSC to the BS in an IP message includes sending the device update data in an IP broadcast message.

11. The method of updating radio network data of claim 10 further comprising the step of assigning the BS to monitor a User Datagram Protocol (UDP) port for device update data.

12. The method of updating radio network data of claim 11 wherein the step of assigning the BS to monitor a UDP port for device update data includes the steps of:

assigning the BS to monitor a first UDP port for a first type of device update data; and

assigning the BS to monitor a second UDP port for a second type of device update data.

13. The method of updating radio network data of claim 12 wherein the step of assigning the BS to monitor a UDP port for device update data includes the steps of:

assigning the BS to monitor a third UDP port for device update data of the first type that is directed to a plurality of BSs in the network; and

assigning the BS to monitor a fourth UDP port for device update data of the second type that is directed to a plurality of BSs in the network.

14. In a radio telecommunications network, a method of updating radio network data in a plurality of devices deployed in a plurality of Base Stations (BSs) in the network, said method comprising the steps of:

interfacing the BSs with a Mobile Switching Center (MSC) through an Internet Protocol (IP) packet data network;

joining each BS in a multicast group;

sending device update data from the MSC to the multicast group in an IP multicast message; and

simultaneously updating the plurality of devices by each of the BSs.

15. The method of updating radio network data of claim 14 wherein the step of sending device update data from the MSC to the multicast group includes sending device update data to a multicast group address that comprises a multicast group designation, a device data type, and a Base Station Identification (BSID).

16. The method of updating radio network data of claim 15 wherein the step of sending device update data to a multicast group address that comprises a multicast group designation, a device data type, and a BSID includes sending device update data to a multicast group address that includes a BSID that indicates that the device update data is applicable to all of the BSs in the network.

17. A system in a radio telecommunications network for updating radio network data in a plurality of devices deployed in a Base Station (BS) in the network, said system comprising:

an Internet Protocol (IP) packet data network for interfacing the BS with a Mobile Switching Center (MSC);

an IP message transmitter in the MSC for sending device update data from the MSC to the BS in an IP message; and

means within the BS for simultaneously updating the plurality of devices.

18. The system for updating radio network data of claim 17 wherein the BS belongs to a multicast group for receiving device update data, and the IP message transmitter sends device update data from the MSC to the multicast group in an IP multicast message.

19. The system for updating radio network data of claim 17 wherein the IP message transmitter sends device update data from the MSC to the BS in an IP broadcast message.

20. The system for updating radio network data of claim 19 further comprising a User Datagram Protocol (UDP) port within the BS for monitoring broadcast messages for device update data.

SUB A'

21. An Internet Protocol (IP) Base Station (BS) in a radio telecommunications network, said BS comprising:

a plurality of radio network devices;

a signaling mechanism for receiving IP messages containing device update data from a Mobile Switching Center (MSC) through an IP packet data network; and

means within the BS for simultaneously updating the plurality of devices with the device update data.

22. The IP Base Station of claim 21 wherein the signaling mechanism receives IP multicast messages that contain device update data.

23. The IP Base Station of claim 21 wherein the signaling mechanism includes at least one User Datagram Protocol (UDP) port for monitoring IP broadcast messages containing device update data.

24. In a radio telecommunications network, a method of updating radio network data in a plurality of devices deployed in a Base Station (BS) in the network, said method comprising the steps of:

interfacing the BS with a Mobile Switching Center (MSC) through an Internet Protocol (IP) packet data network;

assigning each of the plurality of devices an IP address; and

sending device update data from the MSC to each of the plurality of devices in an IP message.

25. The method of updating radio network data of claim 24 wherein the step of sending device update data from the MSC to each of the plurality of devices in an IP message includes sending the device update data in an IP multicast message, and the method further comprises, prior to assigning each of the devices an IP address, the step of joining each of the plurality of devices in a multicast group.

26. The method of updating radio network data of claim 24 wherein the BS includes at least one User Datagram Protocol (UDP) port for monitoring IP broadcast messages, and the step of sending device update data from the MSC to each of the plurality of devices in an IP message includes sending the device update data in an IP broadcast message.